

Application No. 10/049,701

REMARKS/ARGUMENTS

Rejection of Claims 14-16, 18, 19 and 25 Under 35 U.S.C. §103(a) as Being Unpatentable Over Heinz et al.

The examiner rejects in section 2 that claims 14-16, 18, 19 and 25 are rejected as being unpatentable over Heinz et al. The applicant respectfully disagrees with the examiner's interpretation of Heinz et al. for the following reasons. As the examiner has noted, Heinz teaches a dispensing container and "particularly a device for storing and dispensing hygroscopic granular materials such as salt". There is no teaching in Heinz et al. regarding a liquid and Heinz et al. is furthermore silent regarding the specific dimensions of the cup portion and the passage as defined in the claims.

The examiner argues that it would be an obvious matter for the skilled person to adapt the cup of Heinz et al. to have a size to allow the flow of fluid, therefore arriving at the subject matter of the claims. The applicant does not agree and respectfully requests that the examiner reconsiders this rejection.

As the examiner will appreciate, the friction between granules of a granular material, such as salt, is significantly higher than the friction existing between molecules within a liquid. The dispenser of Heinz et al. works because the friction between the individual grains of salt and the walls of the spiral grooves 6 and 7 is sufficiently high that if the shaker is turned upside down the force of gravity alone is insufficient to allow the salt to flow from the passage. The skilled person, consulting Heinz et al., would realize that this principal could not be applied to the dispensing of a liquid. The reason for this is that the principal of friction between the granular pieces of salt must be extended to the friction existing between individual molecules in a liquid, i.e. the viscosity of the liquid. If the spiral passageway is designed so that the only way in which liquid is prevented from emerging from the dispenser when it is inverted is frictional effects arising from the fluid viscosity, the dimensions of the passage would be so small as to be virtually unusable. More importantly, it would be so small that its volume would not meet the definition of claim 14, which states that:

"said passage is sized to have a volume that exceeds the product of the volume of air in the cup portion and a height of the liquid in the cup portion and lid measured by a linear distance between the opening and the spout and a surface of the liquid when

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the cup is inverted, and wherein said volume of said passage is also large enough to then additionally absorb the effect of downward shaking of the cup".

In addition, the use of two spiral grooves 6 and 7 by Heinz et al. would render the device incapable of preventing the flow of a liquid out of the dispenser when the dispenser is inverted. If two pathways are provided and used to dispense a liquid, one of the pathways will arrange itself for flow of liquid out of the dispenser and the other for flow of air into the container. The skilled person consulting Heinz et al. would know this and therefore would have no motivation to even consider trying to adapt the embodiment of Heinz et al. having two spiral grooves 6 and 7 for use with a liquid.

It is furthermore noted that the dispenser of Heinz et al. cannot be considered "a cup" because it is not possible to use the dispenser of Heinz et al. as a cup. The design of Heinz et al. is such that salt can only be dispensed when the dispenser is "moved in a small horizontal, circular path" column 2, line 30. As the examiner will appreciate, this motion is completely unsuitable for use as a cup, since to attempt to drink from a cup whilst simultaneously swirling it in small horizontal circles is difficult and will almost certainly result in some of the liquid missing the user's mouth, were a person to attempt to drink from the dispenser of Heinz et al. This problem would be very important were the cup to be used by a young child.

Finally, although Heinz et al. is silent on the specific dimensions of the spiral grooves 6 and 7, it is clear from the relative proportions in the figures that the spiral grooves of Heinz et al. are contemplated as being so large as to effect no significant frictional resistance to the flow of a liquid from the container. This further teaches the skilled person away from applying the teaching of Heinz et al. to arrive at the present invention.

Applicant respectfully submits that a simple invention may be patentable, even if the invention comprises a combination of features known in the art, provided the combination itself is not obvious. See *In re Dembiczaik*, 50 USPQ 2d 1614, 1617 (Fed. Cir. 1999). "The mere fact that the prior art may be modified in the manner suggested does not make the modification obvious unless the prior art suggested the desirability of the modification." *In re Fritch*, 23 USPQ2d 1780,

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1783-84 (Fed. Cir. 1992). That individual elements of the inventions are old and can be found in the prior art is irrelevant. *Grain Processing Corp. v. American Maize Products Co.*, 5 USPQ2d 1788 (Fed. Cir. 1988). "Only God works from nothing. Men must work with old elements." *Fromson v. Advanced Offset Plate, Inc.*, 755 F.2d 1549, 1556 n.3, 225 USPQ 26, 31 n.3 (Fed. Cir. 1985)

The Examiner presumes that one of ordinary skill in the art would recognize the need for particular materials to be used in particular sizes, in particular places and in a specific configuration to address problems that are not even mentioned or encountered in the prior art (i.e., Heinze et al. address granular salt - not liquid). The Examiner has failed to present a *prima facie* case of obviousness and thus, the present rejection of claims must be withdrawn. For all the reasons set forth above, and properly applying the law, the subject matter of the above-referenced claims is patentable over Heinz et al.

Rejection of Claims 4-19 and 25 Under 35 U.S.C. §103(a) as Being Unpatentable Over Bachman et al. in view of Boese

The applicant does not agree with this rejection and respectfully requests the examiner to reconsider. The examiner argues that Bachman et al. teaches the claimed cup apart from the detachable member being a plug having continuous helical ridges. The examiner believes it would be obvious to replace the detachable member of Bachman et al. with a plug having continuous ridges as is shown in figure 2a of Boese.

Applicant submits that obviousness cannot be established by combining the teachings of the prior art to produce the claimed invention, absent some teaching or suggestion supporting the combination. *ACS Hospital Systems v. Montefiore Hospital*, 221 USPQ 929, 933 (Fed. Cir. 1974). Before obviousness may be established, the Examiner must show that there is either a suggestion in the art to produce the claimed invention or a compelling motivation based on sound scientific principles. *Ex parte Kranz*, 19 USPQ 2d 1216, 1218 (BPAI 1981). Here the Examiner has not established a *prima facie* case of obviousness because both the Bachman et al. et al. and Boese

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references are devoid of any suggestion to substitute a detachable member in order to provide a one piece flow controlling plug, presumably easier to clean and/or use. It appears that in the present case the only suggestion for the Examiner's combination of the teachings in Bachman et al. et al. and Boese improperly stems from the Applicant's own disclosure and not from the cited references themselves. At best, the Examiner's comments regarding obviousness appear to amount to an assertion that one of ordinary skill in the relevant art would have been able to arrive at Applicant's invention because they would have had the necessary skills to carry out the requisite process steps. This is an inappropriate standard for obviousness. In brief, neither of the references alone or in combination provide an impetus necessary to cause one skilled in the art to combine the teachings of the references in the way the Examiner has done.

The Examiner seems in essence to be stating that it would have been "obvious to try" modifying various parameters, and indeed selecting entirely different components and combinations having distinct identifying characteristics, in order to produce the claimed invention. The Federal Circuit has provided clear direction with respect to arguments based on an "obvious to try" theory. The Federal Circuit has held that an "obvious to try" situation exists when a general disclosure may pique a scientist's curiosity, such that further investigation might be done as the result of a disclosure, but the disclosure itself does not contain a sufficient teaching of how to obtain the desired result, or that the claimed result would be obtained if certain directions were pursued. *In re Eli Lilly & Co.*, 14 USPQ2d 1741, 1743 (Fed.Cir. 1990). The Federal Circuit held that "obvious to try" is not to be equated with obviousness under 35 U.S.C. §103. See *Gillette Co. v. S.C. Johnson & Son, Inc.*, 16 USPQ2d 1923, 1928 (Fed.Cir. 1990).

A showing of a suggestion, teaching or motivation to combine the prior art references is an "essential component of an obviousness holding". *Brown and Williamson Tobacco Corp. v. Phillip Morris, Inc.*, 56 USPQ2d 1456, 1459 (Fed. Cir. 2000). As many courts have held, "the best defense against the subtle, but powerful attraction of a hindsight-based obviousness analysis is rigorous application of the requirement for a showing of the teaching or motivation to combine prior art references." *In re Dembiczak*, 50 USPQ2d 1614, 1617 (Fed. Cir. 1999).

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In any event, Applicant submits that even if the skilled person were to do as the Examiner (rather than the prior art) suggested, they would not arrive at the subject matter of claim 1. Claim 1 defines that the volume of the passage is large enough to additionally absorb the effect of downward shaking of the cup. However, Boese specifically teaches against this feature. For example column 2, lines 3 to 4 "the contents may easily be ejected from the container through the plug by simply shaking the container". Boese teaches away rather than toward the present invention. Moreover, even if Bachman et al. could be adapted in view of Boese, the skilled person would not arrive at the subject matter of claim 1. The present invention is directed towards a cup which can resist spillage even when there is downward shaking of the cup. As explained above, the cup arising from adapting Bachman et al. in view of Boese would not have this feature.

Indeed, the skilled person would not even consider applying the teaching of Boese to Bachman et al., because the plug of Boese would allow liquid to be dispensed when shaken. The function of the cup would therefore be impaired compared with the slit valve embodiment disclosed in Bachman et al.. In determining whether the prior art suggested the claimed invention, the references "must be read as a whole and consideration must be given where the references diverge and teach away from the claimed invention". *Akzo N.V. v. United States Int'l Trade Commission*, 1 USPQ2d 1241 (Fed. Cir. 1986) cert denied, U.S. 909 (1987). Reading both Bachman et al. and Boese as a whole, including how they diverge, demonstrates that there is no suggestion or motivation to make the combination proposed by the Examiner.

For these reasons, the applicant believes that the subject matter of the claims is allowable. Withdrawal of the present § 103 rejection is therefore requested.

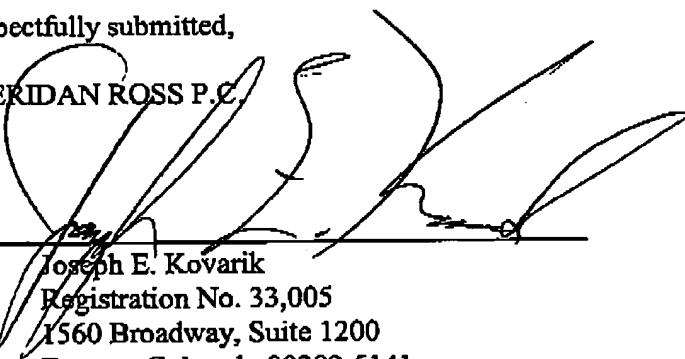
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Based upon the foregoing, Applicants believe that all pending claims are in condition for allowance and such disposition is respectfully requested. In the event that a telephone conversation would further prosecution and/or expedite allowance, the Examiner is invited to contact the undersigned.

Respectfully submitted,

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